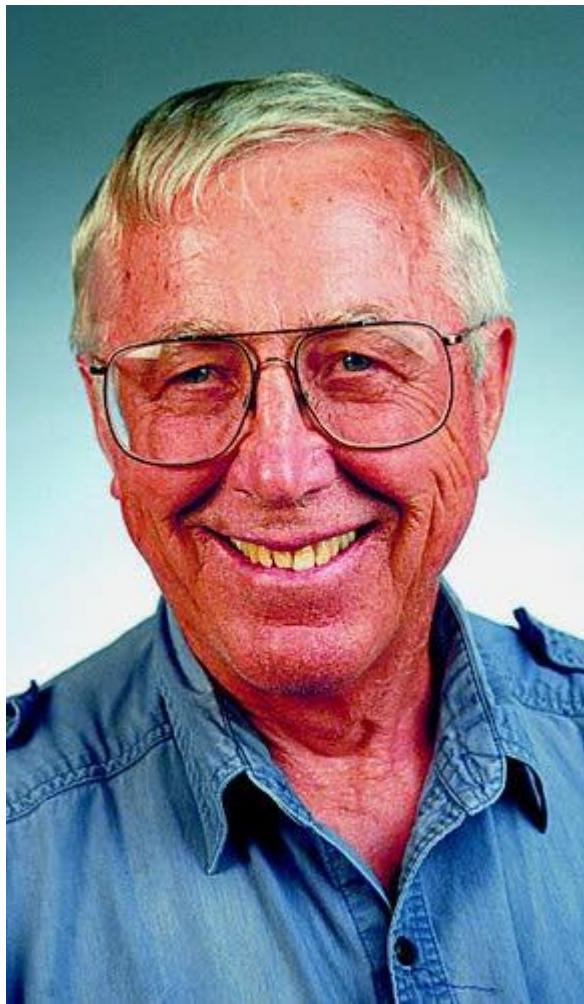


Nothing goes to waste in nature

By Jim Peek for the Tribune

Thursday, March 13, 2008



Jim Peek

We hear about wolves killing more elk than they eat. Surplus killing is considered a waste by some, but is it really?

It is defined as killings that occur over a short period and which are not used by the predator.

Surplus killing of prey by wolves, bears and hyenas was documented in scientific literature at least as far back as the 1960s.

Barren-ground caribou calve all at once on the arctic tundra, and when wolves show up on these calving grounds, they can take large numbers of calves. The phenomenon of highly synchronized calving, exemplified by such creatures as caribou in the Arctic and wildebeest in the Serengeti of Africa, reduces the probability of a calf being preyed upon. Predation, however, can still be extensive.

I witnessed the aftermath of a wolf pack that had killed an entire group of whitetail deer in northeastern Minnesota during an exceptionally deep-snow winter. Many of the deer were simply killed and left without being eaten. It is during the most severe part of the winter and during calving that surplus killing may be most apparent. Anytime prey becomes concentrated and more vulnerable than usual, the gray wolf may well kill more prey than it eats.

Of course, humans are known to kill more game than they can use as well. There was a concerted effort in northern Canada in the 1970s to encourage Inuit hunters to take only enough caribou to fulfill their needs.

The buffalo jumps of the old West provided more dead animals than the Indians could utilize.

I once witnessed a herd of 40 elk shot before shooting hours north of Yellowstone, leaving the game wardens to try to locate enough people to tag and dress the animals to prevent leaving any to spoil.

And today we have people who take more game than they can use, both legally and illegally.

But animals that predators kill and don't eat aren't actually wasted. I once came upon a big cow elk that a cougar had taken down and fed upon. The carcass had melted into the snow and frozen solid, so the cougar left most of it behind. Then a marten took up

residence inside the carcass for the remainder of the winter. Coyotes gnawed on the exposed flesh and hide, and a bald eagle and many magpies and ravens visited the carcass for days. The carcass most certainly wasn't wasted, as it fed many critters over the course of the next few months.

Carcasses of caribou that are left behind in the Arctic provide food for bears, wolverines, foxes, gulls, eagles, hawks, falcons and ravens. In our region, we can add jays, magpies, coyotes, fishers, martens, weasels, raccoons, skunks and bobcats to that list. Even a chickadee has been known to peck at the exposed fat on a piece of carrion.

The presence of wolves in Yellowstone provides the grizzly with a source of protein when the bear takes over a kill. Bones and other parts that the scavengers don't get eventually decay and provide minerals to the soil.

There really is no such thing as waste in nature. There is no such thing as good or bad. These judgments are strictly figments of the human imagination when considering natural phenomena.

We would do well to refrain from superimposing our values on the natural world as we seek to provide better stewardship of our resources

Killing cow elk can help the herd

Jim Peek

Thursday, September 29, 2005

A natural tendency is to consider elk populations to be healthy if they have high numbers of cows.

But population size relative to resources also has a major effect on herd health. And population size has much to do with the proportion of males that are born.

The best-known population of elk lives on an island off the coast of Scotland. In Europe, elk are known as red deer, but at present they are considered one species. The red deer on the Island of Rum had been harvested at a rate of 14 percent of the female population each year to control numbers. When the harvest was curtailed on a portion of the island, females doubled their numbers but males gradually declined. There are no important predators of red deer on the island.

The decline in males was attributed to emigration of 2- to 4-year-olds to other parts of the island, and to increased mortality of males. Also, as the population increased, the proportion of males born declined. Factors predicting emigration rates of males included length of spike antlers, birth weight and population density. These factors are well known to be related to nutritional levels of the population. Smaller spikes and lower weights of newborn calves reflect progressively lowered nutritional levels of the population as it increases in size.

The research at Rum suggested that if maximum production of males and maximum male harvests are a goal, then the density of breeding females should be kept at 50 percent to 60 percent of the ecological carrying capacity of the habitat. This would ensure females will be in highest condition.

The information has application for elk in Idaho and elsewhere. Populations that sustain cow harvests, usually those in limited entry hunts typical in southern Idaho or short general season cow hunts as occur in the Coeur d'Alene region, have higher cow-calf ratios and higher proportions of bulls than the populations in the Clearwater and Salmon backcountry.

Elk hunting in the Idaho backcountry has been confined primarily to bulls with limited cow harvests since the mid-1970s. Many hunters are reticent to take a cow except as a last resort.

The intensive, long-term studies at Rum provide detailed knowledge of the population dynamics and habitat that governs management of the red deer. We do not have this kind of information on elk in Idaho because it is too expensive and time-consuming to obtain.

Then, there is the question of what to do about predation in managing elk populations. To the extent that predators, especially wolves, take the older, less productive cows out of the population, they may be reducing female numbers to levels considerably below the food-

based carrying capacity. But predators also take elk calves and can suppress survival of animals to breeding age. The key is to keep elk populations at levels that produce vigorous calves that are less vulnerable to the predator.

We are going to require more and better knowledge of our elk populations in areas where predators are important. It will not be enough to just kill predators. We will have to maintain elk populations at levels that keep individuals in healthy condition as best we can. It may sound counterintuitive to harvest cows as part of an effort to improve calf production and survival, but we may eventually find ourselves doing just that.

Idaho and Montana will benefit from added federal funding for monitoring and managing wolves. There will be much effort directed at the wolves, but if we are to understand how and why they fluctuate, we will have to understand more about their prey base, including elk. In turn, we'll have to better understand the relationships between elk densities and habitat.

Hunters and others demand more information about the effects of predators, but how is the state wildlife agency to pay for this? Is it entirely up to the hunter to pay, or is there reason for others to also help out? Federal monies usually come with specifications as to what can be done with them.

Further, wildlife management of indigenous species is the prerogative of the states and federal intrusions on this should be minimized.

Considering the biology of the species involved and the complexity of the management scene, we can use as much information as possible, regardless of how we pay for such studies.

Peek is a retired University of Idaho wildlife professor who lives in Viola.

Opinion letters

Sunday, July 15, 2001

Reactionary facts

In a recent column, Jim Peek stated only "reactionaries" believe predators are a factor in declining Lolo Zone elk populations. Peek asserts loss of habitat is the only factor.

It was very ironic, and appropriate, on the same page as Peek's column there was an article explaining how British Columbia biologists plan to kill wolves to save what's remaining of a decimated caribou herd.

This same article quoted Oregon F&G biologist Jim Hines [saying] high cougar and coyote predation are "hammering fawns" leaving the deer population in the Steen Mountains to wither.

Peek's labeling of biologist/sportsmen as reactionaries who believe extreme predation in specific eco systems is also a major factor in declining Idaho elk populations is disingenuous. Especially, when Peek never provides any Idaho Department of Fish and Game data on predation -- just his biased opinion.

IDFG data: The Lolo Zone has the lowest calf survival and the highest predation ever documented by IDFG. The Lolo elk herd is declining 10 percent annually due to low calf survival in addition to its 50 percent population loss. The current Unit 12 calf study documents an astounding 95 percent of all calf mortality is caused by catastrophic predation.

IDFG biologists in 1973 also erroneously assumed low Lolo calf survival was due to poor habitat. A 1973-79 IDFG calf study was conducted in Unit 12 of the Lolo Zone removing approximately 50 percent of the bear population in the study area. Calf:cow ratios

tripled the year the bears were removed. Four years after the bears were removed the elk population increased 76 percent compared to only 7 percent in the remainder of Unit 12. This IDFG study documented habitat was not the primary factor -- it was predators.

Sportsmen need to support IDFG efforts to reduce Lolo predators until predators and elk populations are again in balance to insure enough calves survive to maintain the current low Lolo elk populations.

RICH TUCK

Moscow

REINTRODUCING THE WOLF

Bill Loftus

Thursday, May 24, 1990

Despite fears to the contrary, a hurry-up plan to put wolves back in the wilds of Idaho and Yellowstone National Park appears to be the best option, a leading wildlife biologist says.

Jim Peek, a University of Idaho researcher at Moscow, says he welcomed Sen. James McClure's bill calling for the release of wolves in the national park and the Selway-Bitterroot and Frank Church River of No Return wildernesses.

McClure's bill, the Northern Rocky Mountain Gray Wolf Restoration Act of 1990, was introduced late Tuesday in the Senate. It coincides with a House bill submitted by Rep. Wayne Owens, D-Utah, last summer.

McClure's bill has been sharply criticized by spokesmen for conservation groups who argue the move is too hasty and constitutes an end run on the Endangered Species Act.

While Owens' bill calls for further studies of wolf reintroduction, it also would retain full status for wolves under the Endangered Species Act.

Peek, a spokesman for The Wildlife Society on wolf restoration moves, said the call for action in McClure's bill is appealing.

"I am just really pleased that there is something going into the Senate and I would support it," he added.

There are some bones he would pick with the McClure plan, Peek said, mostly because it removes Endangered Species Act protections for wolves outside designated core areas.

"We could just as well use the experimental population provision within the Endangered Species Act," Peek added.

But the bill offers a pair of particularly attractive carrots. One is turning wolf management over to the state. The second is calling for the release of three "alpha" or breeding pairs of wolves in both Yellowstone and central Idaho.

"I certainly hope McClure's approach takes precedence because we'll never have enough information and we won't know what effects they will have until they get in there," he added.

Three pairs may be too low to try to re-establish a self-sustaining wolf population. But three pairs is a start.

"But once we commit to the reintroduction, if three breeding pairs are not enough, then we should try more," he added.

Mike Medberry, the Idaho Conservation League's public lands director at Ketchum, said the increasing number of wolf sightings in Idaho shows McClure's plan isn't needed.

Medberry said a recovery plan already drawn up by the U.S. Fish and Wildlife Service will be adequate to guide the return of the wolf, while maintaining protections for it under the Endangered Species Act.

The Conservation League welcomes McClure's interest in drafting the plan but rejects it because wolves are returning to Idaho already. "It ain't broke, so don't fix it. The recovery plan is working," he added.

For Peek's part, the sightings in Idaho are been those of lone wolves, most likely transients. The sighting have failed to show wolves are forming packs and establishing resident populations.

Defenders of Wildlife, the conservation group spearheading the push to restore wolves to Yellowstone, welcomed McClure's bill.

"We join Sen. McClure in urging a Senate committee hearing on his proposal as soon as possible," Cutler said in a statement.

"Defenders of Wildlie has some reservations about the detailed provisions of the McClure bill and will continue to support Congressman Owens' approach. But with the existence of the McClure proposal, we are optimistic that a solution to the Yellowstone wolf issue is in sight," he added.

The effort to re-establish woodland caribou in Idaho's Panhandle shows the best of what a state-coordinated restoration program could accomplish, Peek added.

Too much finagling about McClure's plan could set back the return of the wolf in general.

"The main thing is I think we're going to get caught up in a lot of paranoia about the Endangered Species Act and that will just stop it," he added.

Conservation groups should consider what they stand to gain, and to lose, overall. "If they stymie this, they're going to come out with a serious black eye," he added.